

ABSTRACT

1 An apparatus and method for managing and transporting virtual disks over a
2 network to networked stations is disclosed. The apparatus comprises a data storage
3 subsystem and a data processor connected thereto via a network. The data processor
4 includes a virtual disk interface controller to interface with the storage subsystem in
5 handling the input and output for the storage subsystem. The storage subsystem manages
6 a pool of storage blocks in the form of a plurality of virtual disk images and transports the
7 virtual disk images over the network to the virtual disk interface controller. A virtual disk
8 image is emulated as a virtual disk by the virtual disk interface controller and presented
9 to the data processor. The architecture for management and delivery of disk images and
10 the data structure for maintenance of disk images facilitate software deployment and
11 installation onto the networked diskless computers enable highly efficient system
12 administration on the whole network to maximize the network availability.